Electrician Part II

Vocabulary

Ex. 1. *Match the words with their Russian equivalents.*

1. electronic	a. замкнутая цепь
2. a light bulb	b. самоиндукция
3. plug and play	c. частотность
4. self-inductance	d. индуктивный
5. a complete circuit	e. подключить и использовать
6. resistance	f. сопротивление
7. harmonic	g. логика
8. inductive	h. электрическая лампочка
9. magnetized	i. намагниченный
10. mutual inductance	j. взаимная индуктивность
11. frequency	k. электронный
12. logic	l. гармонический

Ex. 2. *Complete the sentences with the given words.*

constant, pulsating, region, insulating layer, coulomb, conductor, flexible thread, in the loop, inductance measurement, inductance meter, primary, A safety device

The _____(1) is essential for understanding how circuits operate effectively.

When you place the wire _____(2), it forms a complete circuit for electricity.

An _____(3) around the wires prevents accidental electrical shocks and enhances safety.

A _____(4) is a unit used to measure the amount of electric charge flowing in a circuit.

The _____(5) circuit is where the main power supply connects, powering the entire system.

To find the inductance value, we can use an _____(6) available in the lab.

A _____(7) like copper allows electricity to flow through it with minimal resistance.

The _____(8) voltage source helps maintain steady current throughout the electrical system.

For this experiment, I need a _____(9) that can easily move without breaking.

In this _____(10), the electrical interference could affect the performance of nearby devices.

The _____(11) current makes it easier for the LED lights to create a bright and vivid glow.

_____(12) such as a circuit breaker can prevent overheating and electrical fires.

Reading

Ex. 1. *Read the text.*

Working as an electrician has its share of challenges and disadvantages. One major drawback is the high level of physical activity involved. Electricians often work in uncomfortable positions, such as crouching, kneeling, or reaching overhead, which can lead to physical strain and fatigue. Furthermore, they are frequently exposed to hazardous conditions. There is always the risk of electrical shocks, burns, and even falls from ladders or elevated platforms.

Another downside is the erratic work schedule. Many electricians find themselves on call during evenings, weekends, or holidays, which can disrupt personal and family time. The job also demands constant learning and adaptation to new technologies and regulations, which can be stressful and time-consuming.

Additionally, the work environment can be less than ideal. Electricians might have to work in extremely hot or cold conditions, or in dirty and cramped spaces. The combination of physical demands and environmental challenges can make the job quite taxing over time. These factors make it clear that working as an electrician, while lucrative and essential, comes with significant disadvantages that one must carefully consider.

Ex. 2. *Answer the questions.*

1. What are some physical challenges that electricians face in their work?

2. What are the potential hazards that electricians are exposed to on the job?

3. How does the erratic work schedule of electricians impact their personal and family life?

4. Why is constant learning and adaptation necessary for electricians?

5. In what types of environments do electricians often have to work?

6. How do the physical demands and environmental challenges of the job affect electricians over time?

7. What are some disadvantages of working as an electrician mentioned in the text?

Communication

Ex. 1. *Make sentences using the following words.*

1. Electricians/job/security
2. They/earn/salary
3. Working/provide/growth
4. Electricians/work/hands
5. They/chance/independently
6. Electricians/role/buildings
7. They/satisfaction/solving
8. Working/creativity/problem-solving
9. Electricians/choose/specialize
10. They/start/business